| Issue (| Classificatio | n |
|---------|---------------|---|
| | | |

| Application/Control No. | Applicant(s)/Patent under Reexamination |
|-------------------------|-----------------------------------------|
| 10/050,861 | HAYASHI ET AL. |
| Examiner | Art Unit |
| Perez M. Angelica | 2618 |

| Angelica M. Perez (Assistant Examiner) (Date) | | | | | | | 15 | SSU | EC | LAS | SIF | ICA] | | 1 | | | | | | |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------|-------------|----------|-------------|-------------|--------|------------------------------------------------|--------------------------------------|--------------|----------|---------|-------|-------------|-----|----------|--------------------------------------------------|----------|--------|--------------|----------|
| Angelica M. Perez (Assistant Examiner) (Date) (Primary Examiner) (Date) (D | | | OF | | | | " <u>, , , , , , , , , , , , , , , , , , ,</u> | | | | | | | | | | | | | |
| NTERNATIONAL CLASSIFICATION 330 129 134 138 279 284 | CL | ASS | | SUBC | LASS | | CLASS | SS SUBCLASS (ONE SUBCLASS PER BLOCK) | | | | | | | | | | | | |
| O 4 B 7/00 370 318 | 45 | 55 | | 5 | 22 | | 455 | 6 | 39 | 335 | | 114 | 1 | 126 | 1 | 127 | 3 | 343 | | |
| Claims renumbered in the same order as presented by applicant CPA | INTE | RNAT | IONA | L CLASSII | CATION | | 330 | 1 | 29 | 13 | 4 | 138 | 3 | 279 | 2 | | | | | |
| Claims renumbered in the same order as presented by applicant CPA | н о | 4 | В | 7 | /00 | | 370 | 3 | 18 | | | | | | | | | | | |
| Claims renumbered in the same order as presented by applicant CPA | | +- | + | <u>'</u> | 1 | | | ऻ ⊸ॕ | | | | | | | | | | | | _ |
| Claims renumbered in the same order as presented by applicant CPA | _ | ┪— | ├ | ļ | | + | | | <u>·</u> | - | | | | | | | | | | |
| Claims renumbered in the same order as presented by applicant CPA | | | _ | ļ | 1 | | | | | | | | | | | _ | | | <u> </u> | |
| Claims renumbered in the same order as presented by applicant CPA | | | <u> </u> | | 1 | | | | | | | | | | | | | | | |
| Claims renumbered in the same order as presented by applicant CPA | | | | | / | | - | | | | | | | | | | | | | |
| Claims renumbered in the same order as presented by applicant CPA | | | | | | | | | | | | | | | Ţ | Total | Claim | s Allo | wed: 39 | ١ |
| Claims renumbered in the same order as presented by applicant CPA T.D. R. | , | (Ac | 31316 | ant Examin | (1 | Jalej | | | | | | | | | | | | | 0.G. | _ |
| Claims renumbered in the same order as presented by applicant CPA | | • | | | | | | | | | | | | | | | | s) | Print F | |
| Claims renumbered in the same order as presented by applicant | (L | .egal | Instr | uments Ex | aminer) | (Dat | e) | | (Pri | mary Exa | aminer) | | (Date |) | | | 1 | | 8 | |
| E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E | | | | | | | | L | - | | | | | | | | <u>.</u> | | | _ |
| E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E E | | Clain | ns re | enumber | ed in th | ne san | ne orde | er as p | oresen | ited by | / appl | icant | | PA | | □ T. | D. | | ☐ R.1. | 4 |
| 1 1 1 2 2 31 26 61 91 121 151 2 2 33 33 63 93 123 153 4 24 34 64 94 124 154 5 25 35 65 95 126 156 6 27 36 66 96 126 156 3 7 37 67 97 127 157 4 8 28 38 68 98 128 158 8 9 99 129 159 9 159 9 159 9 159 9 159 9 159 9 159 9 100 130 160 156 156 156 157 157 157 157 157 157 157 157 157 150 150 160 130 160 160 | | <u>a</u> | | | <u>a</u> | | | <u>a</u> | | | <u></u> | - | | ТТ | | | | | · I | |
| 1 1 1 2 2 31 26 61 91 121 151 2 2 33 33 63 93 123 153 4 24 34 64 94 124 154 5 25 35 65 95 126 156 6 27 36 66 96 126 156 3 7 37 67 97 127 157 4 8 28 38 68 98 128 158 8 9 99 129 159 9 159 9 159 9 159 9 159 9 159 9 159 9 100 130 160 156 156 156 157 157 157 157 157 157 157 157 157 150 150 160 130 160 160 | inal | ie | , | in | gi | | inal | g. | | lual | gi | | la l | gi | | na | gin | | la l | Original |
| 1 1 1 2 2 33 26 61 91 121 151 2 2 33 32 62 92 122 152 3 33 63 93 123 153 4 4 24 34 64 94 124 154 5 5 35 65 95 125 155 156 6 27 36 66 96 126 156 156 3 7 37 67 97 127 157 157 4 8 8 98 128 158 158 158 158 159 199 129 159 199 129 159 199 129 159 199 129 159 199 110 130 160 160 130 160 160 130 160 160 130 160 160 <td< td=""><td>ш</td><td>ō</td><td></td><td> Ц</td><td>Ö</td><td></td><td>L.</td><td>ŏ</td><td></td><td>L L</td><td>Į į</td><td></td><td>II.</td><td> 6</td><td></td><td>正</td><td>Ö</td><td></td><td> Œ ;</td><td>ç</td></td<> | ш | ō | | Ц | Ö | | L. | ŏ | | L L | Į į | | II. | 6 | | 正 | Ö | | Œ ; | ç |
| 2 2 23 32 62 92 122 152 3 33 63 93 123 153 4 24 34 64 94 124 154 5 25 35 65 95 125 155 6 27 36 66 96 126 156 155 3 7 37 67 97 127 157 157 4 8 28 38 68 98 128 158 158 8 9 39 69 99 99 129 159 159 9 10 40 70 100 130 160 160 160 160 160 160 160 160 160 160 160 161 161 163 163 163 163 163 163 163 163 163 163 163 <t< td=""><td>1</td><td>1</td><td>┥,</td><td></td><td>31</td><td>1</td><td>26</td><td>61</td><td>ł</td><td></td><td>91</td><td>1</td><td></td><td>121</td><td>H</td><td></td><td>151</td><td></td><td></td><td>18</td></t<> | 1 | 1 | ┥, | | 31 | 1 | 26 | 61 | ł | | 91 | 1 | | 121 | H | | 151 | | | 18 |
| 3 33 63 93 123 153 4 24 34 64 94 124 154 5 25 35 65 96 126 156 3 7 37 67 97 127 157 4 8 28 38 68 98 128 158 8 9 39 69 99 129 159 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 | | | 7 | 23 | | 1 | | | | | | 1 | | | F | | | | 1 | |
| 5 25 35 65 95 125 155 6 37 36 66 96 126 156 3 7 37 67 97 127 157 4 8 38 68 98 128 158 8 9 99 129 159 99 159 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 166 5 17 | | 3 | | | 33 |] | | | | | _ | 1 | | | | | | | · | 18 |
| 6 27 36 66 96 126 156 3 7 28 38 68 98 128 158 8 9 39 69 99 129 159 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 | | _ | | | |] | | | | | |] | | | | | | | 1 | 8 |
| 3 7 4 8 28 38 68 98 128 158 8 9 39 69 99 129 159 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 143 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 166 5 17 33 47 77 107 137 167 13 18 48 78 109 139 169 15 20 50 80 110 140 170 | | + | _ | | | | | | | | | | | | | | | | | 8 |
| 4 8 9 38 68 98 128 158 8 9 39 129 159 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 | | _ | 4 | 27 | | - | | | | | | - | | | - | | | | 1 | _ |
| 8 9 10 40 70 100 130 160 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 | | - | - | 20 | | - | | | ļ | | | - | | | - | | | | 1 | _ |
| 9 10 40 70 100 130 160 11 29 41 71 101 131 161 10 13 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 166 5 17 33 47 77 107 137 167 167 13 18 48 78 108 138 168 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 <td< td=""><td></td><td>+</td><td>-</td><td>20</td><td></td><td>-</td><td></td><td></td><td></td><td></td><td></td><td>1</td><td></td><td></td><td>_</td><td>•</td><td></td><td></td><td>1</td><td></td></td<> | | + | - | 20 | | - | | | | | | 1 | | | _ | • | | | 1 | |
| 11 29 41 71 101 131 161 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 144 174 25 38 56 86 116 146 176 | | + | | | | 1 | - | | | | | 1 | | | | | | | 1 | _ |
| 12 30 42 72 102 132 162 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 38 56 85 115 145 175 18 26 38 56 86 116 146 176 | | + | _ | 29 | | 1 | - | | 1 | | | 1 | - | | | | | | 1 | _ |
| 10 13 31 43 73 103 133 163 14 44 74 104 134 164 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 | | | _ | 30 | |] | | |] | | | 1 | | | - | | | | 1 | - |
| 11 15 32 45 75 105 135 165 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | 10 | | | 31 | |] | | |] | | | | | | | | | | 1 | |
| 12 16 46 76 106 136 166 5 17 33 47 77 107 137 167 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | | _ | | | 1 | | | | | | | | | | | | | 1 | |
| 5 17 13 18 14 19 15 20 16 21 22 35 23 36 17 24 25 55 18 26 38 108 108 138 109 139 109 139 109 140 110 140 111 141 111 141 112 142 113 143 113 143 114 174 115 145 116 146 116 146 | | + | | 32 | | | <u></u> | | | | |] | | | | | | | 1 | |
| 13 18 48 78 108 138 168 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | | | - | | 1 | | | 1 | <u> </u> | | - | | | | | | | 1 | |
| 14 19 34 49 79 109 139 169 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | | | 33 | | - | | | 1 | | | | | | | - | | | 1 | |
| 15 20 50 80 110 140 170 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | | _ | 24 | _ | 1 | | | 1 | | | 1 | | | | | | | 1 | |
| 16 21 51 81 111 141 171 22 35 52 82 112 142 172 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | + | _ | 34 | | 1 | | | | | | 1 | | | - | | | | 1 2 | |
| 22 35 52 23 36 53 17 24 37 55 85 18 26 38 56 82 112 113 143 143 173 144 174 15 145 16 146 176 | | _ | _ | | | 1 | - | | | | | 1 | | | | | | | 2 | _ |
| 23 36 53 83 113 143 173 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | | | | 35 | | ĺ | | | | | | 1 | | | <u> </u> | | | | 2 | |
| 17 24 37 54 84 114 144 174 25 55 85 115 145 175 18 26 38 56 86 116 146 176 | - | | | | | 1 | | | | | | 1 | | | | | | | 2 | |
| 25 55 18 26 38 56 86 116 145 175 146 176 | 17 | _ | ─ | | | 1 | | | | | | 1 | | | | | | | 2 | |
| 18 26 38 56 86 116 146 176 | | | | | |] | | | | | | | | | | | | | 2 | |
| 19 27 39 57 87 117 147 177 | | | | | | | | | | | 116 | | | 146 | | | | | | 20 |
| 21 28 6 58 88 118 148 178 | | | | | | | | | | | 117 | | | 147 | | | 177 | | 2 | |

120